

EXHIBIT D1



Unified
Investigations & Sciences, Inc.

7311 Highway 329, #1102
Crestwood KY 40014
(502) 243-3110
Fax (502) 243-3810

PRIVILEGED AND CONFIDENTIAL

ENGINEERING REPORT (Initial Draft)

October 4, 2011

PREPARED FOR: Attorney Michael Black
Black, Duggans & Moss
2301 West Big Beaver Road, Suite 720
Troy Michigan 48084

INSURED: William Magee

DATE OF LOSS: May 18, 2010

LOSS LOCATION: 6968 North Hamburg Road, Oldenburg, Indiana 47036

POLICY NUMBER: H6W8074450

CLAIM NUMBER: 14-00395350

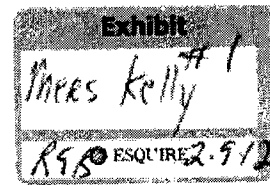
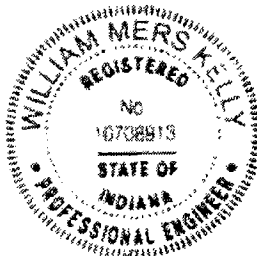
CASE NUMBER: 3:11-cv-40-RLY-WGH

UIS FILE NUMBER: KY011000717

I hereby certify that this engineering document was prepared by me and that I am a duly Licensed Professional Engineer under the laws of Indiana. This seal covers pages 1 through 5 of this document.


William C. Mers Kelly, P.E.

Date: 10/04/2011 License No. PE10708913
My license expires 07/31/2012



Insured: William Magee
UIS File #: KY011000717

October 4, 2011

ASSIGNMENT

Mr. Steve Cottingham, Unified Investigations and Sciences Senior Investigator, requested my assistance on May 21, 2010. My instructions were to assist him in performing a joint scene examination with all interested parties and to collect all relevant evidence on June 2, 2010. Additional instructions to prepare this comprehensive report with exhibits were received September 19, 2011.

EXHIBITS

1. 47 digital photographs with explanations
2. Pictures of a similar model refrigerator
3. LG & Sears Kenmore Refrigerator Recall, June 30, 2005
4. 1 DVD containing 508 Bulk Photographs taken during the exam at scene

BACKGROUND

My knowledge of the circumstances regarding this loss at the time of this report was based on discussions with Mr. Steve Cottingham, Unified Investigations and Sciences Senior Investigator and discussions with Mr. William Magee the insured, Mr. Dan Meyer a neighbor, and other multi-party exam participants.

The involved structure was a 1 ½ story wood framed single family dwelling that faced mostly east with an attached 3 car garage on a concrete foundation with a partial basement and crawl space, asphalt shingle roof, and composite siding. The structure was constructed in 2004 with an underground electrical service and an above ground Liquefied Petroleum (LP) tank both entering the rear (west) side of the structure and both of which were in service at the time of this fire. The structure contained mostly electric appliances with the exception of an LP gas range top.

Mr. Magee lived by himself, was a non-smoker, and did not burn candles at the time of this fire. The morning of the fire, Mr. Magee got up about 4:00 AM EDT, put some clothes in the dryer, took a shower, got the clothes from the dryer, put the dishes in the dishwasher, and started it before leaving about 4:25 AM EDT to go to McDonalds to get something to eat. He turned off all of the lights and did not cook anything that morning before leaving.

Insured: William Magee
UIS File #: KY011000717

October 4, 2011

It was dark and a neighbor Mr. Dan Meyer saw the fire from the road while on his way to work. He drove up to the structure about 5:30 AM EDT and made entry through the dining room door where he saw heavy smoke and flames in the direction of the kitchen area. He turned on the light and called for Mr. Magee. He was forced by the smoke to exit the structure. He then walked around the structure looking for Mr. Magee and left before the Fire Department arrived.

Mr. Magee arrived at the scene after the fire department was on the scene and the structure was fully involved.

OBSERVATIONS / EVALUATION

Examination of the structure revealed heavy fire damage and collapse with the extreme localized damage in the area of the kitchen refrigerator (**Photos 001, 002, 003, 004, 005, 006, & 007**). This extremely concentrated damage occurred with this refrigerator closely surrounded by drywall on three sides. Mr. Magee provided documentation that identified the refrigerator as a 25 cubic foot Sears Kenmore Elite Brand Trio model 79577549600 purchased and installed in October of 2006 from Sears as a replacement for the original refrigerator that had failed.

This refrigerator had a bottom freezer door with two side-by-side doors above and was surrounded on three sides by fully enclosed drywall walls. This refrigerator had extreme fire damage to the point that the steel enclosure and other remains had collapsed to a height of about 16 inches and less (**Photos 008, 009, 010, 011, 014, 021, 022, 023, 045, 046, & 047**). The bottom freezer door front was found lying face down on a protected area of kitchen floor (**Photos 023, 024, 025, 026, 027, 028, 029, 030, 031, 032, 033, 034, 035, 036, 037, & 038**). The above side-by-side doors were in the area above this door. Inspection of the area around and under the refrigerator revealed that a section of the subfloor under the refrigerator was totally consumed with the refrigerator metal base sitting on the exposed gravel crawl space surface (**Photos 039 & 040**). Electrical conductor and component fragments consistent with those used in this type of refrigerator were found in and around this refrigerator. A few of these fragments exhibited damage consistent with electrical activity.

Damage to all other appliances was consistent with varying degrees of fire attack (**Photos 006, 009, 010, 012, 013, 015, 016, 017, 018, 019, & 020**). There was no evidence of branch wiring or other competent ignition sources located under the floor under the refrigerator.

Insured: William Magee
UIS File #: KY011000717

October 4, 2011

ANALYSIS

The extremely concentrated fire damage to this refrigerator relative to the other appliances, the degree of inward collapse, and the position of the doors was consistent with greater fire damage and fire emanating from inside this refrigerator and not external fire attack (Photos 008, 009, 010, 011, 014, 021, 022, 023, 045, 046, & 047).

The degree of fire consumption and damage to the internal components and the floor under the refrigerator were consistent with Mr. Cottingham's origin and cause determination. Some of the localized damage to this refrigerator was consistent with electrical activity indicating that this refrigerator was energized during the fire. This evidence further indicated that the initial fire occurred inside this refrigerator.

With the refrigerator closely surrounded on three sides by fully enclosed drywall partitions, external fire attack would have interrupted power to the refrigerator before the fire reached the internal components unless it occurred from the front. The lack of external damage to the bottom refrigerator door exterior and the floor in front eliminated the possibility of external fire attack from the front of this refrigerator. It also provided further evidence that fire emanated from within this refrigerator causing the door to fall forward (Photos 023, 024, 025, 026, 027, 028, 029, 030, 031, 032, 033, 034, 035, 036, 037, & 038).

The extreme extent of the fire damage and limited amount of inspection of this refrigerator during the June 2, 2010, scene examination prevented identification of the specific failure mode within this refrigerator at the time of this report.

CONCLUSIONS

It is my professional opinion with a reasonable degree of engineering certainty based on the data available at the time of this report that:

1. This fire loss was caused by a failure within the involved Sears Kenmore Elite Brand Trio refrigerator.
2. This failure resulted in the ignition and consumption of the combustible internal components of this refrigerator.

Insured: William Magee
UIS File #: KY011000717

October 4, 2011

COMMENTS

The requested scope of this inquiry is complete with the formal submittal of this report. Digital photographs, photographs with descriptions, research data, and diagrams generated during the course of this examination have been included in and/or enclosed with this report.

This report supplements Mr. Steve Cottingham's Origin and Cause Report for this fire, and was based upon information available at the time the report was written. The right to amend this report if additional information becomes available is hereby reserved.

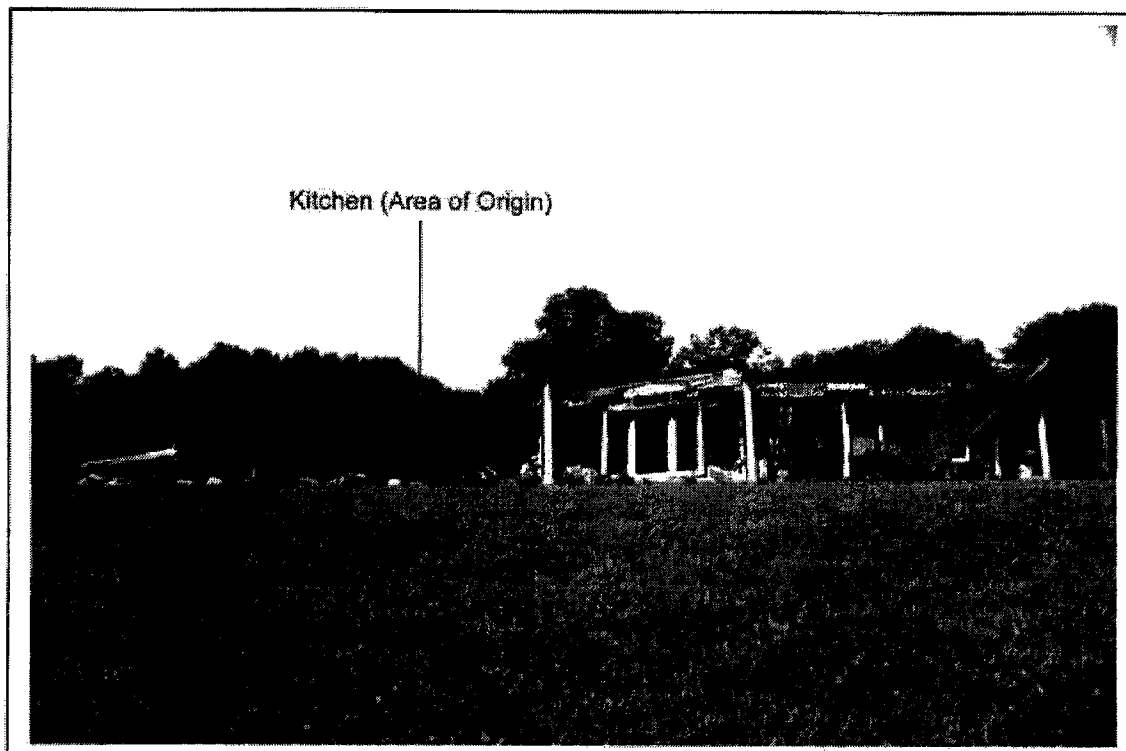
The evidence secured was being maintained at Unified Investigation and Sciences Indianapolis Service Center pending disposition notice.

William C. Mers Kelly, P.E.
Forensic Engineer
Unified Investigations & Sciences, Inc.
(502) 243-3110

EXHIBIT 1

Unified Investigations & Sciences, Inc.

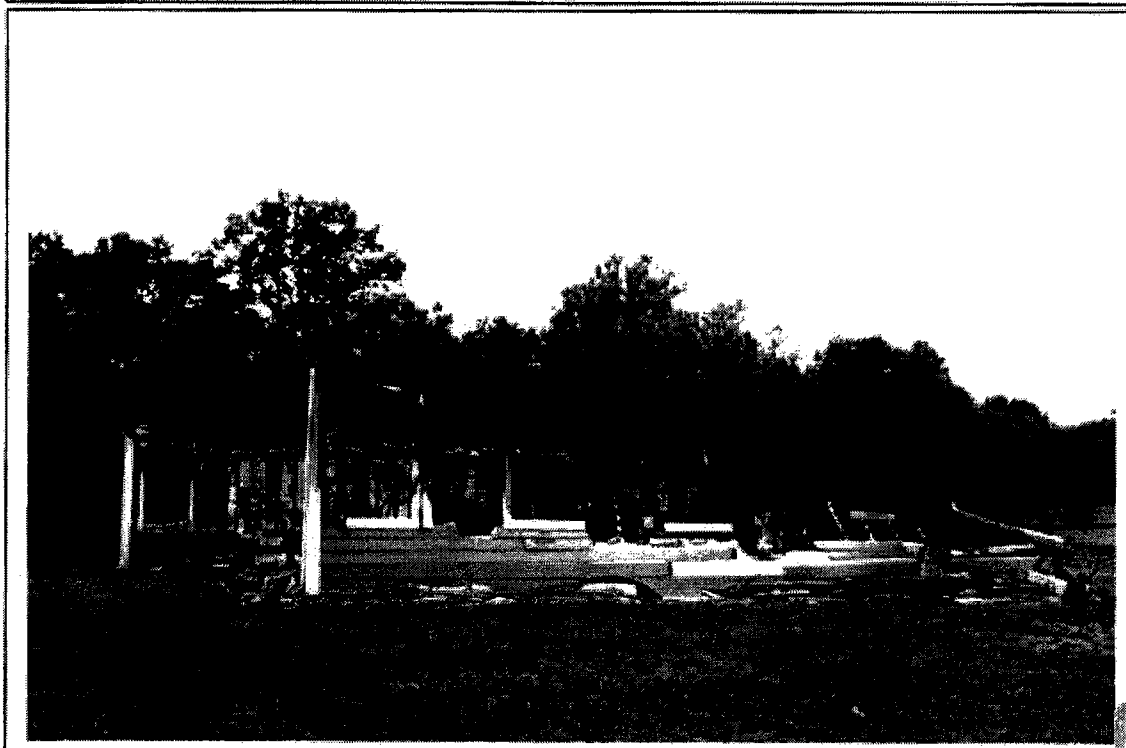
Insured : William Magee **UIS File # :** KY011000717



Photograph #

001

View of the east
(front) of the
structure



Photograph #

002

View of the
south side of the
structure

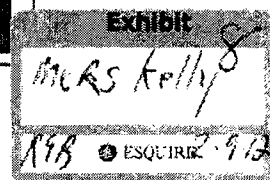
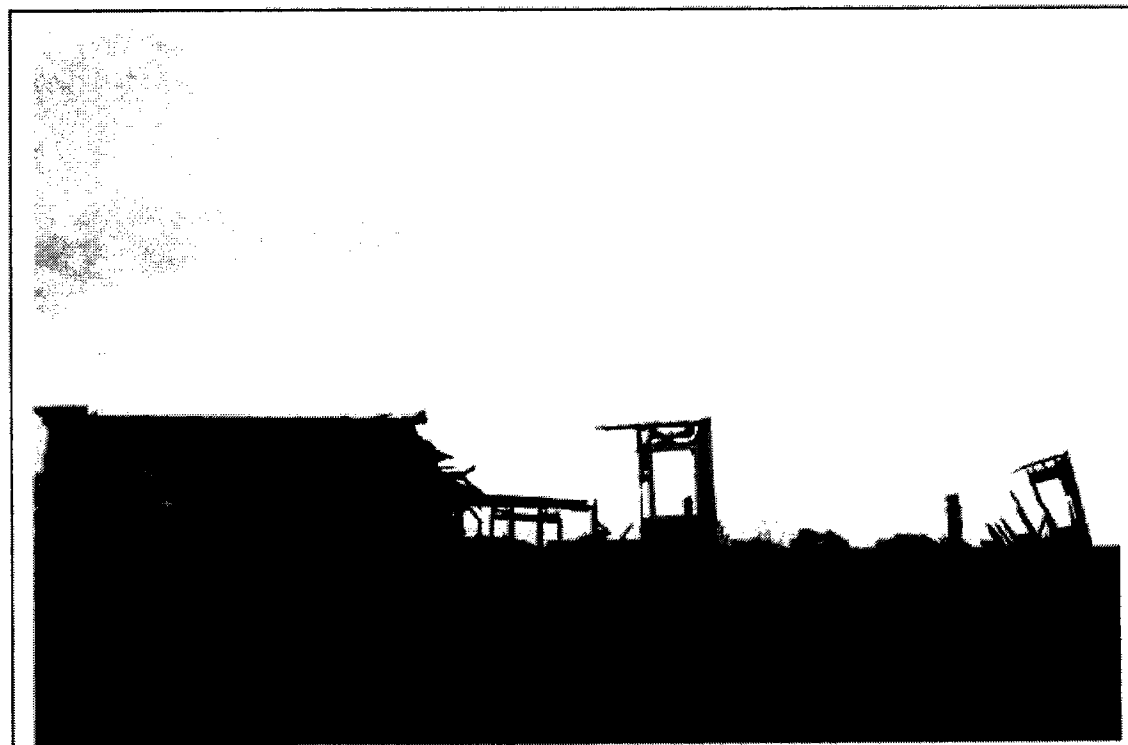


EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee **UIS File # :** KY011000717



Photograph #

003

View of the
west (rear) of
the structure



Photograph #

004

View looking
west from the
front porch

EXHIBIT 1

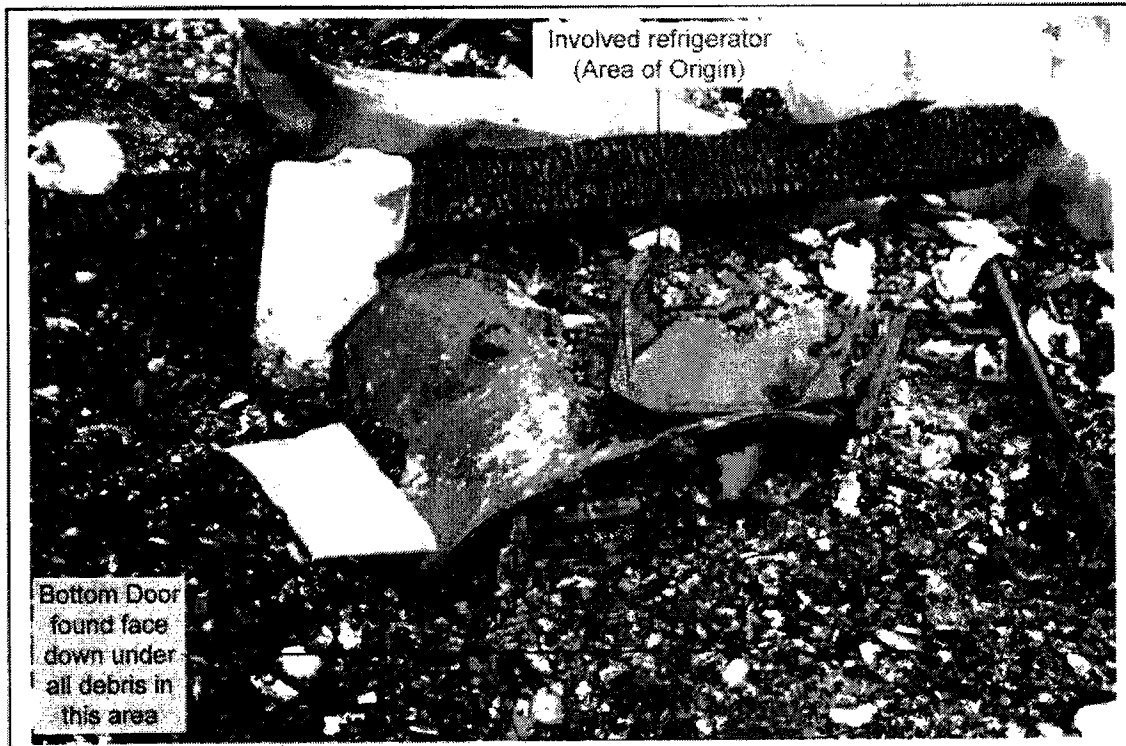
Unified Investigations & Sciences, Inc.

Insured :

William Magee

UIS File # :

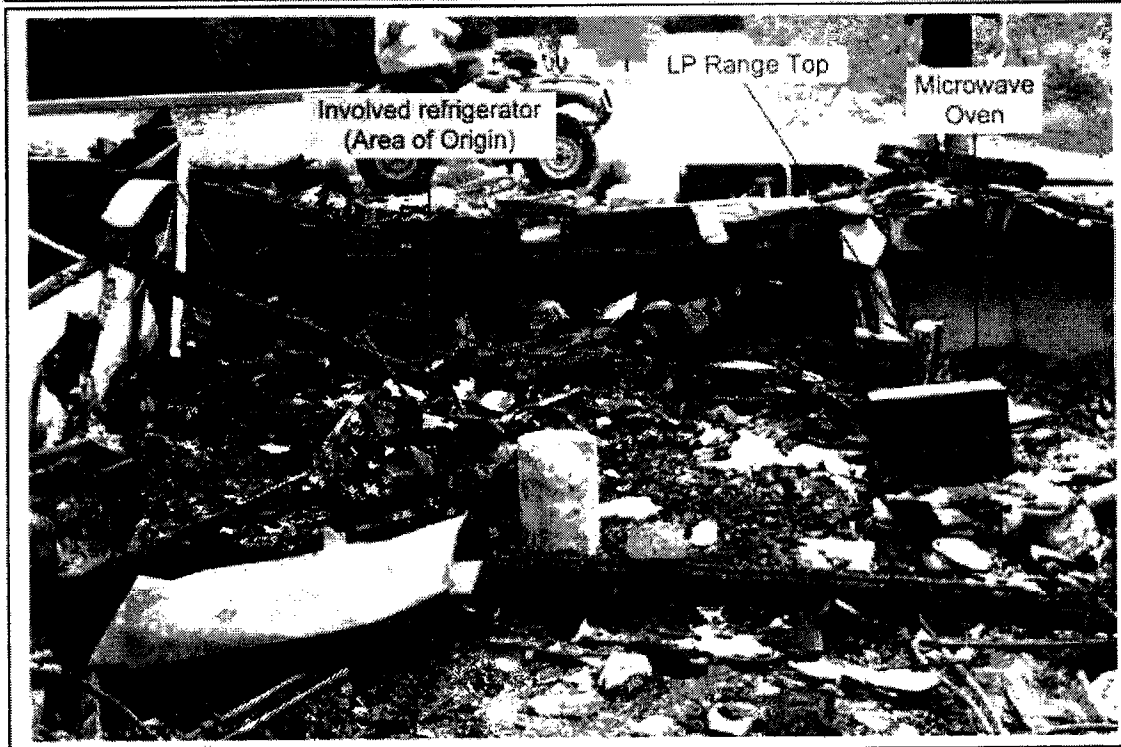
KY011000717



Photograph #

005

**View of the
involved
refrigerator**



Photograph #

006

**View of the
kitchen facing
east towards the
front porch**

EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee **UIS File # :** KY011000717



Photograph #

007

View facing north

EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee UIS File # : KY011000717



Photograph #

008

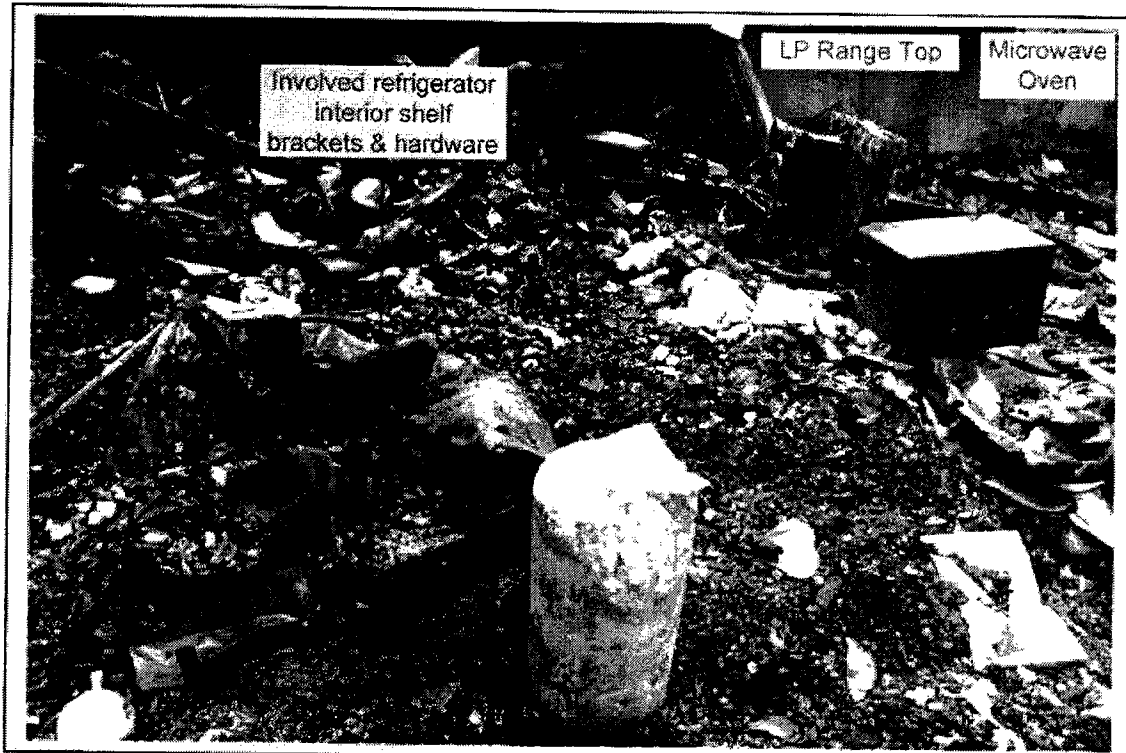
View of the
involved
refrigerator looking
down

EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee

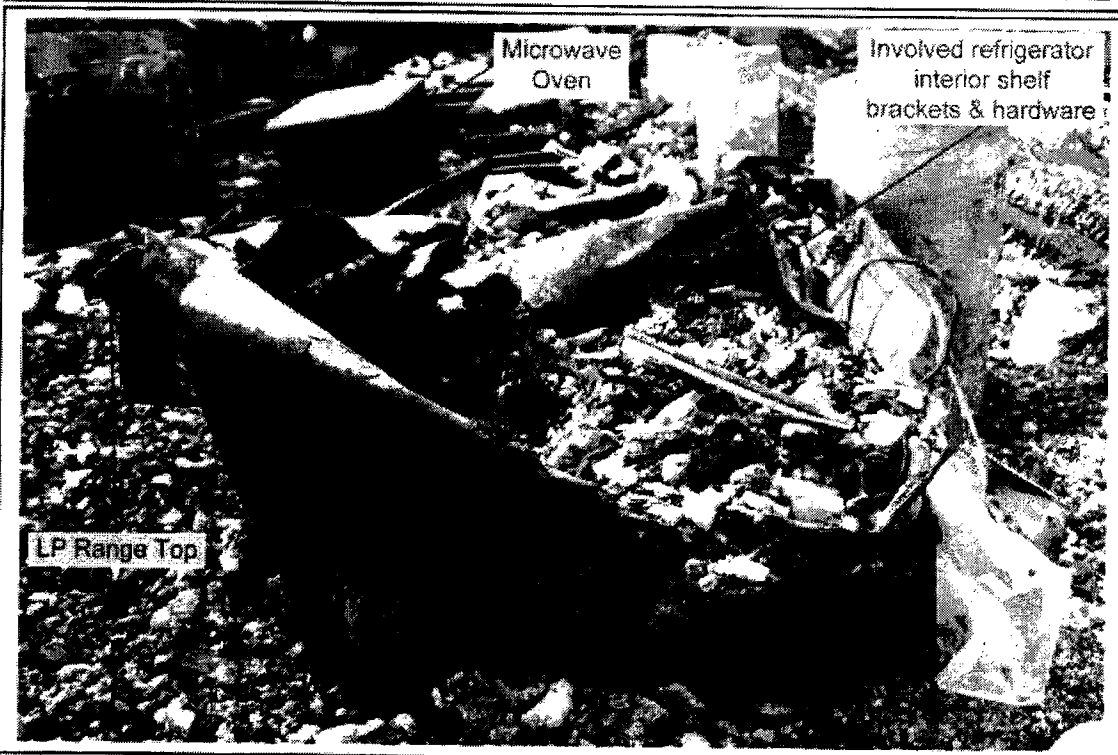
UIS File # : KY011000717



Photograph #

009

**View of the
kitchen**



Photograph #

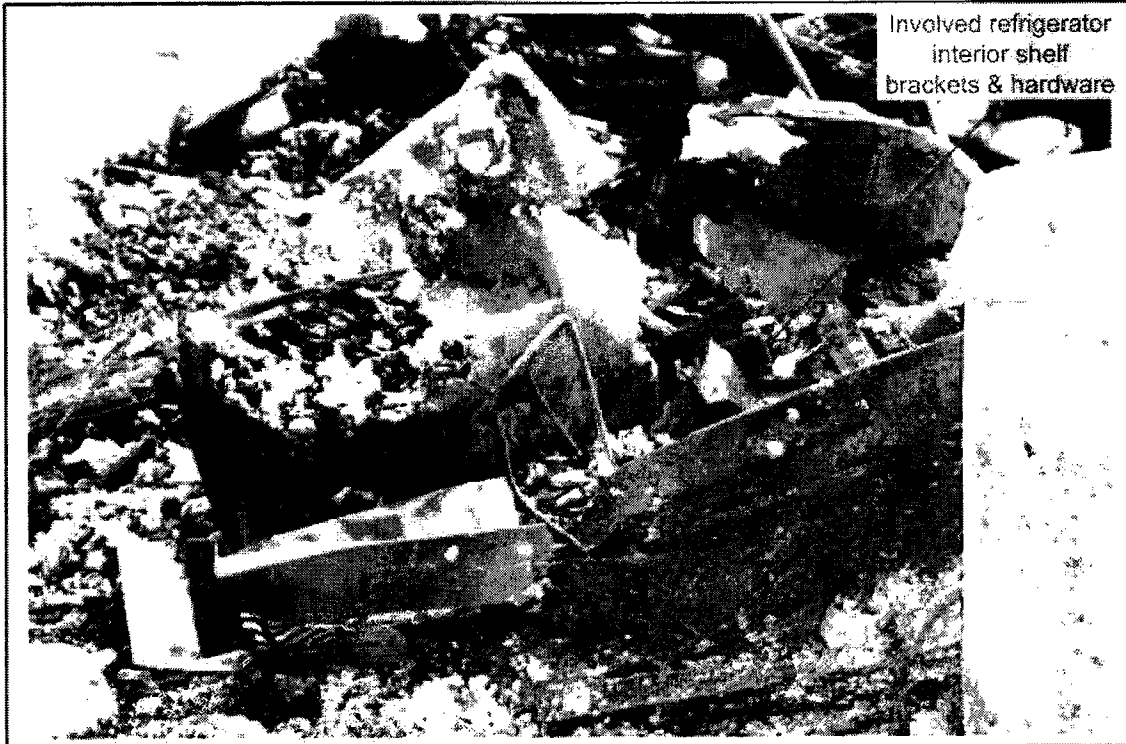
010

**View of the
involved
refrigerator**

EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee **UIS File # :** KY011000717



Photograph #

011

Close up view
of the involved
refrigerator



Photograph #

012

View of the
microwave oven
near the
involved
refrigerator

EXHIBIT 1

Unified Investigations & Sciences, Inc.

Insured : William Magee **UIS File # :** KY011000717



Photograph #

013

View of the
microwave oven &
LP range top near
the involved
refrigerator